



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/490,965	01/24/2000	Michael J Heller	249/292	7864
34263	7590	03/30/2005	EXAMINER	
<b>O'MELVENY &amp; MEYERS</b> 114 PACIFICA, SUITE 100 IRVINE, CA 92618				DEJONG, ERIC S
		ART UNIT		PAPER NUMBER
		1631		

DATE MAILED: 03/30/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/490,965	HELLER ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Eric S. DeJong	1631	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 14 October 2004 and 13 December 2004.
- 2a) This action is FINAL.                            2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 83-91, 95, 97-101, 104, 105 and 107 is/are pending in the application.  
~~4a) Of the above claim(s) 1-82, 92-94, 96, 102, 103, and 106 are canceled~~ ~~is/are withdrawn from consideration.~~
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 83, 84, 91, 95, 97-101, 104, 105 and 107 is/are rejected.
- 7) Claim(s) 85-90 is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
  - a) All    b) Some \* c) None of:
    1. Certified copies of the priority documents have been received.
    2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
    3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- 1) Notice of References Cited (PTO-892)
- 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) Notice of Informal Patent Application (PTO-152)
- 6) Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicants' submission filed on 14 October 2004 has been entered.

Applicants' arguments, filed 14 October 2004, have been fully considered but they are not deemed to be persuasive. Rejections and/or objections not reiterated from previous office actions are hereby withdrawn. The following rejections and/or objections are either reiterated or newly applied. They constitute the complete set presently being applied to the instant application.

Claims 1-82, 92-94, 96, 102, 103, and 106 have been canceled. Claims 83-91, 95, 97-101, 104, 105, and 107 are pending in the instant application.

## **VAGUENESS AND INDEFINITENESS**

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 91, 95, 97-101, 104, 105, and 107 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claims 83 and 84 have been amended to clarify the contacting practice of such a composite location of permeation layer and electrode. However, the wording of claims 91, 95, 97-99, and 104 remains unclear as to what component(s) of "said location" are actually being placed at a particular charge or electrical potential. For example, the above described issue of indefiniteness was resolved in instant claim 83 by the amended phrase "placing the electrode of the microlocation at an opposite charge to the biomolecule". This amendment sufficiently clarified the previous ambiguous wording of "placing said location at an opposite charge". Clarification regarding the placing of a charge/electrical potential to a specific component of the location comprising a permeation layer coupled to an electrode via clearer claim wording is requested. Claims 100, 101, 105, and 107, which directly or indirectly dependent from claims 95, 97-99, and 104, also contain this unclarity due to their dependence.

### ***Claim Rejections - 35 USC § 103***

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to

Art Unit: 1631

consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claims 83 and 84 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kreisher (P/N 4,589,965), taken in view of Ramachandran et al. (P/N 5,109, 124).

This rejection is reiterated and maintained from the previous office action, mailed 12/16/03, and is necessitated by amendment regarding an array of microlocations comprising a permeation layer coupled to a plurality of electrodes. Contrary to the argument presented by applicants, Kreishner teaches alternative embodiments of the invention apart from the use of plate electrodes. Column 2, lines 54-57 of Kreishner demonstrates an embodiment where "(t)he electrodes are laid out in a grid fashion". This is further supported in column 4, lines 55-59 wherein an embodiment of the invention is disclosed employing electrodes that comprise a "platinum grid system". A reasonably broad interpretation of electrodes (a plurality of electrodes) arranged in a grid fashion (an organized array) meets the limitation an array of microlocations comprising a plurality of electrodes as instantly claimed.

### **CLAIM OBJECTIONS**

Claims 83-90 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eric S. DeJong whose telephone number is (571) 272-6099. The examiner can normally be reached on 8:30AM-5:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ardin Marschel, Ph.D. can be reached on (571) 272-0718. The fax phone number for the organization where this application or proceeding is assigned is (571) 272-8300.

Any inquiry of a general nature or relating to the status of this application should be directed to Legal Instrument Examiner, Tina Plunkett, whose telephone number is (571) 272-0549.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

EDJ *EDJ*

*Ardin H. Marschel 3/23/05*  
ARDIN H. MARSHEL  
EXAMINER  
ART UNIT 1631